Basis for Amendments

The USPTO rejected Claims 1 - 8 and 19 - 20 as being indefinite. In particular, the USPTO asserted that the description of the geared core winder and the locking piece and the relationship between the geared core winder and the donut-shaped locking piece was not adequately described in the claims, thereby making the claims indefinite.

The applicant has amended Claims 1 and 19 to overcome this objection. In particular, the applicant has described the "geared core winder" as comprising at least a first donut-shaped piece containing a central opening and at least one locking pin opening. (The drawing which shows this element best is Figure 1.) The embodiment of the first donut-shaped piece in this figure is component 118 and the locking pin openings are components 119. Additional amendments are made to the claim language to clarify the relationship between these two components. Support for these amendments is contained on page 6, lines 23 - 28, page 9, lines 21 - 30, page 15, lines 18 through page 16, line 1, page 16, lines 3 - 12, and page 18, line 30 through page 19, line 12, as well as Figure 1.

The applicant has also amended the last line of Claims 1 and 19 to more accurately describe the limitation on rotation between the donut-shaped locking piece and the geared core winder. As now amended, the claims state that when a locking pin is present in locking pin openings in both the geared core winder and the generally donut-shaped locking piece, rotation of the donut-shaped locking piece in relation to the geared core winder is prevented "except in combination with" the geared core winder. Thus, the two components must rotate in concert. Basis for this amendment is contained on page 15, line 15 through page 16, line 26. In particular, on page 16, lines 21 - 26 the specification states:

> Because the donut-shaped locking piece (20) is restricted in rotation except in combination with the first donut-shaped piece 118 of the geared core winder (110), rotation of the geared core winder is restricted by this locking mechanism (10).

The limitation on rotation is also clearly disclosed by Figure 1 and Figure 2.

Claim 20 has also been amended pursuant to the suggestion of the Examiner.

No new subject matter is introduced by any of these amendments to the claims.

Amendments to Specification

Upon review of the specification the applicant has discovered that there is a misidentification of some of the terms and their numerical designations. In particular, the "locking mechanism (10)" is frequently referenced in the specification as the "locking piece (20)". By this amendment applicant corrects this error in the specification throughout the application. Basis for this amendment and support for the proper designation of this component is disclosed on page 6 at lines 12, 14, 18, and 24, page 14, lines 16 - 17 and page 15, line 8, as well as in each of Figures 1, 2, and 3.

Please amend the paragraph beginning on page 15, at line 15 and ending on page 16, line 26 as follows

> The rotation of the donut-shaped locking mechanism ~~(20)~~ (10) in relation to the donut-shaped piece (118) of the geared core winder (110) can be further restricted by use of any conventional device. In one preferred embodiment a plurality of openings (24) are cut into the donut-shaped locking ~~piece (20)~~ mechanism (10) which line up with corresponding openings (119) cut in the outside surface (142) of the donut-shaped piece (118) of the geared core winder (110). To restrict axial rotation of the donut-shaped locking mechanism ~~(20)~~ (10) in relation to the donut-shaped piece (118), key locking pins (30) are

placed, and may be secured, within the plurality of openings (24) in the donut-shaped locking ~~piece (20)~~ mechanism (10) and project into the openings (119) in the outside surface (142) of the donut-shaped piece (118). Alternatively, and preferably, the key locking pins (30) are secured only into the openings (119) in the outside surface (142) of the donut-shaped piece (118). (Other locking systems, such as built-in holding studs, may be used as an alternative to the key locking pins(30).) Once these key locking pins (30) are in position within both the key locking pin openings ~~(211)~~(24) and the openings (119) of the donut-shaped piece (118), rotation of the donut-shaped locking ~~piece (20)~~mechanism (10) in relation to the donut-shaped piece (118) of the geared core winder is prevented. In this structure the donut-shaped locking ~~piece (20)~~mechanism (10) and the first donut-shaped piece (118) of the geared core winder can only rotate in combination around the shaft (112). While the combination of the donut-shaped locking ~~piece (20)~~mechanism (10) and the first donut-shaped piece (118) may freely rotate around the shaft (112) in one axial direction, because of the rotation limitation systems (40) of the locking mechanism (10), free rotation of the locking mechanism ~~system~~ (10) in the opposite axial direction is prevented.

Because the donut-shaped locking ~~piece (20)~~ mechanism (10) is restricted in rotation except in combination with the first donut-shaped piece (118) of the geared core winder (110), rotation of the geared core winder is restricted by this locking mechanism (10).

Additional errors in the specification of this same type are contained in the first full paragraph on page 17 as follows:

> An advantage of this locking mechanism (10) of the invention is that rotation can be prevented in either a clockwise or counterclockwise direction, merely by reversing the orientation of the donut-shaped locking ~~piece (20)~~ mechanism (10). To reverse the orientation, the donut-shaped locking ~~piece (20)~~ mechanism (10) is removed from the shaft (112), rotated 180° so that the inner face of the donut-shaped locking ~~piece (20)~~ mechanism (10) now becomes the outer face of the donut-shaped locking ~~piece (20)~~ mechanism (10) and then the donut-shaped locking ~~piece (20)~~ mechanism (10) is again placed onto the shaft (112). This rotation also reverses the orientation of the rotation limitation system (40). In this orientation, rotation of the geared core winder (110) is restricted in the opposite direction from the previous position.

Further errors of this same type are contained on the paragraph beginning at page 18, line 24 through page 19, line 22.

> To restrict further rotation of the geared core winder (110) once the plates (138) are firmly secured against the inner surface of the roll core, the donut-shaped locking ~~piece (20)~~ mechanism (10) is placed over the shaft (112) and locked in place against the first donut-shaped piece (118). Other shapes for the locking piece may also be used. To lock it into position, the key locking pins (30), which are secured within a plurality of openings (24) in the donut-shaped locking ~~piece (20)~~ mechanism (10), are inserted into openings (119) in the outer surfaces of the donut-shaped piece (118). The key locking pins(30) may also be first positioned within the openings (119) in the outside surface (142) of the first donut-shaped piece (118) and then the plurality of openings (24) in the donut-shaped locking ~~piece (20)~~ mechanism (10) are rotated until the key locking pins (30) fit with the plurality of openings (24). Once the locking mechanism (10) is in position, rotation of the core roll is permitted only in one direction. Rotation in the other direction is restricted because of the interaction between

the plates (138) and the inner surface of the core roll. Rotation in the opposite axial direction is prevented by the rotation limitations systems (40) contained in the locking mechanism. The direction of permitted rotation can be reversed merely by removing the donut-shaped locking ~~piece (20)~~ mechanism (10) from the shaft (112), rotating it 180° and again placing it on the shaft (112).

Because the proper designation of this particular component is clear, the applicant requests that these amendments to the specification be made. No new subject matter is introduced by any of these amendments.

Discussion

The USPTO rejected Claims 1 - 8 and 19 - 20 under 35 USC §112 second paragraph as being indefinite. The applicant has reviewed this assertion, made amendments to Claims 1 and 19 and believes that he has overcome the objections by the Examiner. In the Office Action, the Examiner states that the "applicant" needs to define which element within the geared core winder is considered to be openings and how they are connected." In order to respond to this assertion, the applicant has added claim language stating that the geared core winder comprises "at least a first donut-shaped piece containing a central opening and at least one locking pin opening". In the embodiment in the drawings and detailed description, the first donut-shaped piece corresponds to component 118 on Figures 1 and 2. The central opening corresponds to component 122 on Figure 1 and the locking pin openings correspond to component 119 on Figure 1. The applicant has also amended various other language of the claims to clarify its language.

In addition, the applicant has amended the last line of each of Claims 1 and 19 to clarify that when the locking pins are in position within both the openings of the geared core winder and the donut-shaped locking piece each locking pin "prevents rotation of the donut-shaped locking piece except in combination with the geared core winder."

By this amendment, the applicant has made it clear that once the locking pins are in position within both the geared core winder and the locking piece, the donut-shaped locking piece and the geared core winder move only in coordination around a shaft which is placed within their central openings. In addition, when a rotation limitation system is secured within one of these same central openings, one-way directional rotation is also prevented. The applicant believes that by this amendment, the asserted indefiniteness of the claims has been overcome.

The applicants believes that by these amendments, he has overcome the objection of the Examiner.

The USPTO also rejected Claim 19 under 35 USC §102 (b) as being anticipated by Morgan, U.S. Patent No. 5,135,180. The applicant respectfully traverses this rejection.

The USPTO asserts that component 18 of the geared core winder of the '180 Patent is equivalent to the donut-shaped locking piece of the invention. Further, the USPTO asserts that the key locking pins are formed by components 34 and 36.

The applicant has defined the terms of his invention such that the entire system that is disclosed in the '180 Patent is a "geared core winder". The "geared" portion of the core winder is formed by the outer gears that are present on components 32, which interact with the central gear 40. Each of these outer gears, 32, with pins at each end, 34 and 36, fit into slots 30 in each of the donut-shaped pieces, 18 and 20.

It is clear that the donut-shaped piece 18 moves in coordination with the donut-shaped piece 20. That movement is required because the entire system is interrelated and interconnected. There is no independently operating donut-shaped locking piece that operates separate and distinct from the geared core winder which comprises all components disclosed in the '180 Patent. If the donut-shaped locking piece is removed from the system that is disclosed in the application, the remaining components can still function as a geared core winder. In contrast, if component 18 is removed from the system of the '180 Patent, the system will literally fall apart. Each of the three outer gears (32) will fall out of openings 30 and there will be nothing to support a core which is placed over those gears.

Accordingly, the applicant respectfully asserts that the system disclosed in the '180 Patent can not function both as a geared core winder and as the donut-shaped locking piece. There is no component disclosed in the '180 Patent which is equivalent to the donut-shaped locking piece nor is there any system for locking that donut-shaped locking piece to the geared core winder. The applicant respectfully requests that this rejection be withdrawn.

Finally, the applicant believes that all amendments to the claim can be considered without a new search. In addition, the applicants assert that all amendments to the claims place those claims in condition for allowance. Further, the amendments to the claims are made not in response to a substantive rejection but rather merely to comply with objections of the Examiner. Such amendments are permitted after a final rejection pursuant to 37 C.F.R. 1.116(b) and MPEP 714.12. Therefore, the applicant requests that the claims be allowed.

Conclusion

The applicant believes that he has placed all claims in condition for allowance and requests the issuance of a Notice of Allowability. If there are any questions concerning this amendment, please contact applicant's counsel.

Respectfully Submitted,

Scott R. Cox
Reg. No. 31,945
LYNCH, COX, GILMAN & MAHAN, P.S.C.
500 West Jefferson St., Suite 2100
Louisville, Kentucky 40202
(502) 589-4215

CERTIFICATE OF SERVICE

I hereby certify that this correspondence is being deposited with the United States Postal Service in an envelope addressed to Mail Stop AF, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

Dated: April 17, 2006 Holly Hart

SRC:hh
R:\Patents\p1155\P1155amendment04-12-06.wpd
90212